

IN THE CLAIMS:

1. (Previously Presented) In a network of devices, a method for a querying device to determine the availability of network-connected devices, the method comprising:

at a querying device, building a graphical user interface (GUI) representation of network-connected devices, prior to sending a query to network-connected devices;

following the building of the GUI, sending a query from the querying device to the network-connected devices;

in response to the queries, updating the GUI representation of the network-connected devices.

2. (Previously Presented) The method of claim 1 further comprising:

at a querying device user interface, issuing a network discovery command; and

wherein building the GUI includes building the GUI in real-time, in response to querying device user interface network discovery command.

3. (Previously Presented) The method of claim 2 wherein building the GUI includes initially representing each of the network-connected devices as unavailable.

4. (Previously Presented) The method of claim 3 wherein sending the query to the network-connected devices includes

spawning a thread from the querying device to query each of the network-connected devices; and

the method further comprising:

receiving a query reply from a first network-connected device; and

wherein updating the GUI representation includes changing the GUI representation of the first network-connected device to available.

5. (Previously Presented) The method of claim 4 further comprising:

failing to receive a query reply from a second network-connected device; and

wherein updating the GUI representation includes maintaining the GUI representation of the second network-connected device as unavailable.

6. (Previously Presented) The method of claim 5 wherein failing to receive a query reply from the second network-connected device includes:

accepting a timeout period for the second network-connected device query; and

if the timeout period expires before a query reply is received, determining that the second network-connected device is unavailable.

7. Canceled

8. (Previously Presented) The method of claim 6 wherein spawning a thread from the querying device to the network-connected devices includes using a function selected from the group including a Sockets connect function, a ping function, and a NSLookup function.

9. (Previously Presented) The method of claim 6 wherein spawning a thread from the querying device to the network-connected devices includes requesting a True/False answer;

wherein receiving a query reply from the first network-connected device includes returning a True answer; and

wherein changing the GUI representation of the first network-connected device to available includes changing the GUI representation to available in response to a True answer.

10. (Previously Presented) The method of claim 9 further comprising:

returning a False answer if the timeout period expires before a query reply is received for the second network-connected device; and

wherein maintaining the GUI representation of the second network-connected device as unavailable includes maintaining the GUI representation as unavailable in response to the False answer.

11. (Previously Presented) The method of claim 10 wherein building the graphical user interface (GUI) representation of network-connected devices includes building a GUI on a computer with a graphical interface; and

wherein spawning a thread from the querying device to the network-connected devices includes requesting the availability of network-connected devices selected from the group including printers, copiers, scanners, faxes, automatic teller machines (ATMs), remote sensors, virtual private network (VPN) devices, satellite devices, and other computers.

12. (Previously Presented) The method of claim 1 further comprising:

accepting a periodic refresh command; and

wherein building the GUI representation of network-connected devices includes refreshing the GUI in response to a refresh command.

13. (Previously Presented) In a network of connected devices, a method of building a graphical user interface (GUI) representing the availability of the network-connected devices independent of system timeouts, the method comprising;

from a querying device, building a graphical user interface (GUI) representation of network-connected devices initially representing network-connected devices as unavailable;

sending a query to a network-connected device; and

modifying the GUI representation of the network-connected device in response to sending the query.

14. (Previously Presented) The method of claim 13 wherein building the GUI includes initially representing the network-connected device as unavailable;
the method further comprising:
receiving a query reply from the network-connected device;
and,
wherein modifying the GUI representation includes representing the network-connected device as available in response to the query reply.

15. (Previously Presented) In a network of connected devices, a system for displaying network device availability, the system comprising:
a querying device having a graphical user interface (GUI) representing network-connected devices, the querying device having a network connection port;
at least one device having a network connection port for communications with the querying device; and
wherein the querying device sends a query ~~[[to5]]~~ to network-connected devices, after building the GUI, and updates the GUI representation of the network-connected devices in response to sending the queries.

16. (Previously Presented) The system of claim 15 wherein the querying device has a user interface to accept commands;
and

wherein the querying device builds the GUI in real-time, in response to commands from the querying device user interface.

17. (Original) The system of claim 16 wherein the GUI initially represents each of the network-connected devices as unavailable.

18. (Previously Presented) The system of claim 17 wherein the querying device spawns a thread to query each of the network-connected devices, and in response to receiving a query reply from a first network-connected device, changes the GUI representation of the first network-connected device to available.

19. (Previously Presented) The system of claim 18 wherein the querying device maintains the GUI representation of a second network-connected device as unavailable, in response to not receiving a query reply from the second network-connected device.

20. (Previously Presented) The system of claim 19 wherein the querying device further includes an operating system and a timer configured with a default timeout value;

wherein the querying device maintains the GUI representation of the second network-connected device as unavailable, in response to not receiving a query reply, as follows:

starting the timer at the beginning of each network-connected device query; and

if the timeout period expires before a query reply is received from the second network-connected device, determining that the second network-connected device is unavailable.

21. Canceled

22. (Original) The system of claim 20 wherein the querying device spawns a thread to query each of the network-connected devices by using function selected from the group including a Sockets connect function, a ping function, and a NSLookup function.

23. (Previously Presented) The system of claim 22 wherein the querying device GUI requests a True/False answer in response to each network-connected device query;

wherein the querying device GUI receives a True answer from the first network-connected device; and

wherein the querying device GUI changes the representation of the first network-connected device to available in response to a True answer.

24. (Currently Amended) The system of claim 23 wherein the querying device generates a False answer in response to a [[the]] timeout period expiring before a query reply is received for the second network-connected device; and

wherein the querying device GUI maintains the representation of the second network-connected device as unavailable in response to the False answer.

25. (Original) The system of claim 15 wherein the querying device is a computer and the GUI is represented on a visual display attached to the computer; and

wherein the network-connected devices are selected from the group including printers, copiers, scanners, faxes, automatic teller machines (ATMs), remote sensors, virtual private networks (VPNs), satellite devices, and computers.

26. (Previously Presented) The system of 20 wherein the timer is configured with a refresh rate value; and

wherein the querying device accepts commands for spawning threads to network-connected devices at the refresh rate value; and

wherein the querying device refreshes the GUI, in real-time, in response to the refresh rate value.